## **Environmental Protection Agency**

## APPENDIX A TO SUBPART E OF PART 53— REFERENCES

- (1) American National Standard Quality Systems—Model for Quality Assurance in Design, Development, Production, Installation, and Servicing, ANSI/ISO/ASQC Q9001–1994. Available from American Society for Quality, P.O. Box 3005, Milwaukee, WI 53202 (http://qualitypress.asq.org).
- (2) American National Standard Quality Systems for Environmental Data and Technology Programs—Requirements with guidance for use, ANSI/ASQC E4-2004. Available from American Society for Quality, P.O. Box 3005, Milwaukee, WI 53202 (http://qualitypress.asq.org).
- (3) Quality Assurance Guidance Document 2.12. Monitoring PM<sub>2.5</sub> in Ambient Air Using Designated Reference or Class I Equivalent Methods. U.S. EPA, National Exposure Research Laboratory, Research Triangle Park, NC, November 1998 or later edition. Currently available at <a href="http://www.epa.gov/ttn/amtic/pmqainf.html">http://www.epa.gov/ttn/amtic/pmqainf.html</a>.
- (4) Military standard specification (mil. spec.) 8625F, Type II, Class 1 as listed in Department of Defense Index of Specifications and Standards (DODISS), available from DODSSP-Customer Service, Standardization Documents Order Desk, 700 Robbins Avenue, Building 4D, Philadelphia, PA 1911-5094.
- (5) Quality Assurance Handbook for Air Pollution Measurement Systems, Volume IV: Meteorological Measurements. Revised March, 1995. EPA-600/R-94-038d. Available from National Technical Information Service, Springfield, VA 22161, (800-553-6847, http://www.ntis.gov). NTIS number PB95-199782INZ.
- (6) Military standard specification (mil. spec.) 810-E as listed in Department of Defense Index of Specifications and Standards (DODISS), available from DODSSP-Customer Service, Standardization Documents Order Desk, 700 Robbins Avenue, Building 4D, Philadelphia, PA 1911-5094.

 $[62\ {\rm FR}\ 38799,\ {\rm July}\ 18,\ 1997,\ {\rm as\ amended}\ {\rm at}\ 71\ {\rm FR}\ 61295,\ {\rm Oct.}\ 17,\ 2006]$ 

## Subpart F—Procedures for Testing Performance Characteristics of Class II Equivalent Methods for PM<sub>2.5</sub>

Source: 62 FR 38814, July 18, 1997, unless otherwise noted.

## §53.60 General provisions.

(a) This subpart sets forth the specific requirements that a  $PM_{2.5}$  sampler associated with a candidate Class II equivalent method must meet to be designated as an equivalent method for

- $PM_{2.5}$ . This subpart also sets forth the explicit test procedures that must be carried out and the test results, evidence, documentation, and other materials that must be provided to EPA to demonstrate that a sampler meets all specified requirements for designation as an equivalent method.
- (b) A candidate method described in an application for a FRM or FEM determination submitted under §53.4 shall be determined by the EPA to be a Class II candidate equivalent method on the basis of the definition of a Class II FEM in §53.1.
- (c) Any sampler associated with a Class II candidate equivalent method (Class II sampler) must meet all applicable requirements for FRM samplers or Class I FEM samplers specified in subpart E of this part, as appropriate. Except as provided in §53.3(a)(3), a Class II PM <sub>2.5</sub> sampler must meet the additional requirements as specified in paragraph (d) of this section.
- (d) Except as provided in paragraphs (d)(1), (2), and (3) of this section, all Class II samplers are subject to the additional tests and performance requirements specified in §53.62 (full wind tunnel test), §53.65 (loading test), and §53.66 (volatility test). Alternative tests and performance requirements, as described in paragraphs (d)(1), (2), and (3) of this section, are optionally available for certain Class II samplers which meet the requirements for reference method or Class I equivalent method samplers given in 40 CFR part 50, appendix L, and in subpart E of this part, except for specific deviations of the inlet, fractionator, or filter.
- (1) Inlet deviation. A sampler which has been determined to be a Class II sampler solely because the design or construction of its inlet deviates from the design or construction of the inlet specified in 40 CFR part 50, appendix L, for reference method samplers shall not be subject to the requirements of §53.62 (full wind tunnel test), provided that it meets all requirements of §53.63 (wind tunnel inlet aspiration test), §53.65 (loading test), and §53.66 (volatility test).
- (2) Fractionator deviation. A sampler which has been determined to be a Class II sampler solely because the design or construction of its particle size